



## UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
[www.uspto.gov](http://www.uspto.gov)

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/085,813	02/28/2002	Steven James Wojcik	KCX-450 (16960)	2378
7590	04/30/2009		EXAMINER	
Neal P. Pierotti Dority & Manning, Attorneys at Law, P.A. P.O. Box 1449 Greenville, SC 29602			HAUGLAND, SCOTT J	
			ART UNIT	PAPER NUMBER
			3654	
			MAIL DATE	DELIVERY MODE
			04/30/2009	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.



UNITED STATES PATENT AND TRADEMARK OFFICE

Commissioner for Patents  
United States Patent and Trademark Office  
P.O. Box 1450  
Alexandria, VA 22313-1450  
[www.uspto.gov](http://www.uspto.gov)

**BEFORE THE BOARD OF PATENT APPEALS  
AND INTERFERENCES**

Application Number: 10/085,813

Filing Date: February 28, 2002

Appellant(s): WOJCIK ET AL.

---

Ryan P. Harris  
For Appellant

**EXAMINER'S ANSWER**

This is in response to the appeal brief filed 1/28/09 appealing from the Office action  
mailed 10/28/08.

**(1) Real Party in Interest**

A statement identifying by name the real party in interest is contained in the brief.

**(2) Related Appeals and Interferences**

The examiner is not aware of any related appeals, interferences, or judicial proceedings which will directly affect or be directly affected by or have a bearing on the Board's decision in the pending appeal.

**(3) Status of Claims**

The statement of the status of claims contained in the brief is correct.

**(4) Status of Amendments After Final**

The appellant's statement of the status of amendments after final rejection contained in the brief is correct.

**(5) Summary of Claimed Subject Matter**

The summary of claimed subject matter contained in the brief is correct.

**(6) Grounds of Rejection to be Reviewed on Appeal**

The appellant's statement of the grounds of rejection to be reviewed on appeal is correct.

**(7) Claims Appendix**

The copy of the appealed claims contained in the Appendix to the brief is correct.

**(8) Evidence Relied Upon**

Application No. 11/931,066

Application No. 11/799,043

Application No. 11/930,977

1,648,990	LITTLE	11-1927
4,583,698	NISTRÌ et al	4-1986
5,437,417	KAMMANN	8-1995
WO 98/52857	MENZ et al	11-1998
6,264,132	MENZ et al	7-2001
3,869,095	DILTZ	3-1975
5,379,964	PRETTO et al	1-1995
4,133,495	DOWD	1-1979
4,988,052	URBAN	1-1991
4,208,019	DUSENBERY	6-1980

**(9) Grounds of Rejection**

The following ground(s) of rejection are applicable to the appealed claims:

Claims 71-106 and 108-116 are provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 61-84 of copending Application No. 11/931,066, claims 1-27 of copending Application No. 11/799,043, or claims 1-34 of copending Application No. 11/930,977. Although the conflicting claims are not identical, they are not patentably distinct from each other because the copending application claims include the subject matter of the claims of this application.

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

Claims 71-75, 77, 83, 84, 87, 90-99, 101, 103-106, and 108-115 are rejected under 35 U.S.C. 103(a) as being unpatentable over Little (U.S. Pat. No. 1,648,990) in view of Nistri et al (U.S. Pat. No. 4,583,698) and Kammann (U.S. Pat. No. 5,437,417).

Little discloses a winder for web comprising a web transport apparatus including a conveyor belt 12 and a plurality of winding modules (13, etc.) positioned along the web transport apparatus. Each winding module comprises a mandrel 19 and a positioning apparatus (18, 21, etc.) in operative association with the mandrel configured to move the mandrel into and out of engagement with the conveyor belt.

Little does not disclose that the mandrel is in operative association with a driving device for center driving the mandrel or that each mandrel extends across the web transport apparatus from a first side to a second side.

Nistri et al teaches making winding mandrels 13 extend a web transport apparatus 9 from a first to a second side, teaches using a vacuum conveyor 9 and vacuum roll 8 to feed and facilitate threading of a web in a winder, teaches winding tissue web unwound from a parent roll, and teaches placing a core 11 on a winding mandrel 13.

Kammann teaches providing a web winder with a driving device in operative association with a mandrel of a winding module for center driving and rotating the mandrel.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to make each mandrel in Little extend across the web transport apparatus from a first side to a second side as taught Nistri et al to permit winding of

wide unslit webs. It would have been obvious to provide Little with a driving device for center driving the mandrel as taught by Kammann to provide greater control over the winding process to permit improved winding of different webs.

With regard to claim 73, the drive taught by Kammann would inherently brake the belt and mandrels at times during operation.

With regard to claim 75, it would have been obvious to one having ordinary skill in the art at the time the invention was made to provide Little with a vacuum conveyor for feeding the web to the winding modules as taught by Nistri et al to maintain feeding engagement with the web and to facilitate threading through the winding apparatus.

With regard to claim 84, it would have been obvious to position the winding modules at the end of a tissue machine to for tissue rolls.

With regard to claim 87, it would have been obvious to at least three winding modules that operate in different stages as taught by Nistri et al to ensure continuous operation of the winder.

With regard to claim 91, it would have been obvious to supply tissue from a parent roll to the winding mandrels as taught by Nistri to form smaller tissue rolls.

With regard to claim 92, it would have been obvious to provide a core on the mandrels as taught by Nistri et al to facilitate attachment of web and removal of the wound product.

With regard to claim 108, it would have been obvious to duplicate parts of the winder of Little to simultaneously wind more than two slits to increase production capacity.

With regard to claim 109, it would have been obvious to accelerate the mandrel prior to forming the nip to prevent damage to the web and belt.

Claims 76 and 102 are rejected under 35 U.S.C. 103(a) as being unpatentable over Little in view of Nistri et al and Kammann as applied to claim 71 above, and further in view of Menz et al (doc. no. WO 98/52857).

Little does not disclose that the web transport apparatus that is an electrostatic belt.

Menz et al teaches using an electrostatic belt (in lieu of rollers 3, 4) to feed web material (page 6, third full paragraph; col. 3, lines 24-29 of corresponding US Pat. No. 6,264,132).

It would have been obvious to one having ordinary skill in the art at the time the invention was made to provide Little with a web transport apparatus in the form of an electrostatic belt as taught by Menz et al to provide more positive gripping and feeding of the web.

Claim 78 is rejected under 35 U.S.C. 103(a) as being unpatentable over Little in view of Nistri et al and Kammann as applied to claim 71 above, and further in view of Diltz (U.S. Patent No. 3,869,095).

Little does not disclose a vacuum supplied mandrel.

Diltz teaches providing a winding apparatus with vacuum supplied mandrels 40, 41 for attaching a leading end of web to be wound to the cores.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to provide Little with vacuum supplied mandrels as taught by Diltz to attach web to the cores without the need for adhesive.

Claim 79 is rejected under 35 U.S.C. 103(a) as being unpatentable over Little in view of Nistri et al and Kammann as applied to claim 71 above, and further in view of Pretto et al (U.S. Patent No. 5,379,964).

Little does not disclose that the mandrels are made of a carbon fiber composite. Pretto et al teaches forming a web winding mandrel of a carbon fiber composite to provide a lightweight mandrel having high strength and stiffness.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to form the mandrels of Little of a carbon fiber composite as taught by Pretto et al to make them light weight with high strength and stiffness.

Claims 80 and 100 are rejected under 35 U.S.C. 103(a) as being unpatentable over Little in view of Nistri et al and Kammann as applied to claim 71 above, and further in view of Dowd (U.S. Patent No. 4,133,495).

Little does not disclose a tail sealing apparatus.

Dowd teaches providing a web winding apparatus with a tail sealing apparatus to prevent unwinding of an outer end of a web from a finished roll.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to provide Little with a tail sealing apparatus as taught by Dowd to prevent unwinding of an outer end of the web from a completed product roll.

Claim 81 is rejected under 35 U.S.C. 103(a) as being unpatentable over Little in view of Nistri et al and Kammann as applied to claim 71 above, and further in view of Urban (U.S. Patent No. 4,988,052).

Little does not disclose applying adhesive to the web prior to engagement with one of the winding modules.

Urban teaches applying adhesive to the leading end and trailing end of web 7 being wound before it engages winding modules 4, 5, 6.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to apply adhesive to the web in Little prior to engagement with one of the winding modules as taught by Urban to facilitate attachment of the web to the modules and initiation of winding.

Claims 82, 85, and 86 are rejected under 35 U.S.C. 103(a) as being unpatentable over Little in view of Nistri et al and Kammann as applied to claim 71 above, and further in view of Dusenbery (U.S. Pat. No. 4,208,019).

Little does not disclose a core loading or product stripping apparatus.

Dusenbery teaches providing a winding apparatus with a core loading and product stripping apparatus.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to provide Little with a core loading and product stripping apparatus as taught by Dusenberry to reduce manual labor required to operate the apparatus.

**(10) Response to Argument**

Appellants argue that Little teaches away from mandrels extending across the web transport apparatus (section I.A.1. of the brief). However, a lack of disclosure is not the same as a teaching against. Little does not disclose any problem that would discourage an ordinary artisan with knowledge of the state of the art from making the mandrels extend from one side of the winding apparatus to the other side. Appellants' argument that problems would arise from the rubber not being centered on the wind-up surface if the mandrels in Little were extended to the full width of the winding apparatus is without basis. As would be clear to an ordinary artisan, there would be no problem winding a roll that is not centered on the mandrel. Note that the rolls are not even disclosed as being centered in Little (see Fig. 2). Contrary to appellants' assertion, making the mandrels extend the width of the belt would not require both of the strips of material in Little to be wound on the same mandrel. The lengths of the mandrels in Little are more than half of the width of the conveyor belt and are wider than the strips of material to be wound. Only one strip is attached to each mandrel to initiate winding thereon. E.g., the first mandrel winds one strip of material while the other strip of material is carried by the belt past the first mandrel to the second mandrel and wound thereon.

Appellants argue that Nistri et al fails to disclose mandrels extending across the web transport apparatus (section I.A.2. of the brief). However, the roll supports or mandrels formed by 11, 13, and 613 (Fig. 3) in Nistri et al do extend from a first side to a second side of the web transport apparatus and suggest forming the mandrels in Little to extend the full width of the belt and web transport apparatus.

Appellants argue that modifying Little with the driving device of Kammann would render Little unsatisfactory for its intended purpose (section I.A.3. of the brief). However, appellants' proposed modification of Little (purportedly based on the teachings of Kammann) would not have been obvious to an ordinary artisan. Kammann teaches winding a web by a combination center driving (in which the mandrel is driven) and surface driving (in which the roll is driven through frictional contact with its periphery). This is referred to as central contact winding in Kammann (e.g., see col. 2, lines 14-18). It is well known in the art how to adjust and control nip pressure during surface driving (whether driving with a belt or roller), so there would be no reason to think that Kammann or Little as modified by Kammann would have the problems described by appellants.

Appellants argue that Little teaches away from center driven mandrels (section I.A.4. of the brief). However, lack of disclosure is not the same as a teaching against. Kammann teaches adding a center drive (mandrel drive) in order to allow for the satisfactory winding of a greater variety of webs rather than requiring different winding apparatus for different types of webs.

Appellants argue that the combination of Little, Nistri et al, and Kammann does not suggest the limitations of claim 74, particularly that "each mandrel is movably positioned so that the distance between the mandrel and the web transport apparatus is varied so as to produce the nip having a nip pressure, a web being wound into a rolled product by combination of mandrel rotational speed, web surface speed, incoming web tension, and nip pressure" (section I.B. of the brief). However, this is disclosed by all three references. It is the basis of their operation. E.g., appellants describe the operation of Little on page 18 of the brief.

Appellants argue that the combination of Little, Nistri et al, and Kammann does not suggest the core loading and product stripping apparatus of claim 77 (section I.C. of the brief). However, while Little discloses apparatus for loading cores and unloading rolls (note the trolley including wheels 14 and rails 15 in Fig. 2), Nistri et al also teaches these features (note 16, 17 in Fig. 1 and the positioning mechanism for 13 in Figs. 2 and 3 and page 16 of the brief).

With regard to claim 83 (section I.D. of the brief), Little as modified, if not the disclosure of Little, includes the subject matter of claim 83. Also, note Nistri et al.

With regard to claim 91 (section I.E.1. of the brief), it is noted that acceleration of the mandrel is inherent or implicit in all of the applied references. For example, the mandrels are clearly not rotating when loaded onto supports and do rotate when contacting moving web on the conveyer belts, thus requiring acceleration. The rotating mandrel is positioned adjacent to the conveyor belt as required by the claim.

The arguments of sections I.E.2. through I.E.5. of the brief have been addressed above.

With regard to claim 93 (section I.F. of the brief), Little discloses slitting of the web. Mandrels that extend the width of the conveyor belt as taught by Nistri et al would not prevent winding of slit material. The mandrels in Little are more than one half of the width of the belt and are wider than the strips of material to be wound. The first mandrel overlies portions of both strips. Only one strip is attached to each mandrel to initiate winding thereon. Making the mandrels in Little the full width of the conveyor belt would not change the operation of the winder for winding slit webs.

With regard to claim 94 (section I.G. of the brief), controlling the position and speed of the winding module to produce a rolled product with desired characteristics is implicit or explicit in the applied references. The other limitations of the claim have been addressed above.

With regard to claim 95 (section I.H. of the brief), Little discloses winding by surface winding only. The mandrel is positioned toward the web transport apparatus with a controllable magnitude in Little and the other applied references.

Appellants argue that Kammann explicitly teaches away from the combination of claim 97 (I.I. of the brief). This is not the case. Kammann teaches combined center and surface winding (this is mode of operation referred to as central contact winding in Kammann; col. 2, lines 14-18).

With regard to claim 98 (section I.J. of the brief), Little discloses removing wound material from the winding apparatus. Nistri et al teaches stripping a wound roll from a mandrel.

With regard to claim 103 (section I.K. of the brief), Little discloses loading mandrels and removing wound rolls from the winding apparatus. Nistri et al teaches loading cores on mandrels and removing wound rolls.

With regard to claim 104 (section I.L. of the brief), the unloading of rolls is substantially simultaneous with the loading of empty mandrels in Little as disclosed. The disclosed purpose of two sets of winding stations (each set including two winding stations) is to allow unloading of wound rolls from one set while winding takes place on the other set.

With regard to claim 106 (section I.M. of the brief), the claimed process fault does not distinguish over the completion of a wound roll in Nistri et al.

With regard to claim 108 (section I.N. of the brief), duplication of parts to increase capacity and efficiency would have been obvious to an ordinary artisan.

With regard to claim 109 (section I.O. of the brief), if it were not a matter of basic knowledge of an ordinary worker in the art, Kammann points out that some webs are particularly prone to damage due to roller contact (col. 2, lines 19-27). In addition, Kammann teaches switching between surface driving (in which pressure roller 2 corresponding to belt 12 of Little contacts the periphery of the forming roll) and non-surface driving modes. Surface driving occurs in the mode referred to in Kammann as central contact winding (col. 2, lines 14-18). In the apparatus of Little as modified by

Kammann, initially accelerating the mandrel/web roll in the non-surface driving mode in which the belt 12 of Little (corresponding to contact roller 2 in Kammann) is spaced from the mandrel/web roll and thereafter switching to a surface driving mode in which the belt contacts the mandrel/web roll reads on the limitations of claim 109.

With regard to claim 110 (section I.P. of the brief), all of the applied references disclose the recited limitations.

With regard to claims 113 and 114 (sections I.Q. and I.R. of the brief), the claimed process fault does not distinguish over the completion of a wound roll in Nistri et al.

Appellants provide no additional arguments for the patentability of claims 76, 102, 78, 79, 80, 100, or 81 (sections II. through VI. of the brief).

Appellants argue that the limitations of claim 82 would not be met by incorporation of the turret of Dusenberry into the winding apparatus of Little (section VII.A.1. of the brief). However, the test for obviousness is not whether the features of a secondary reference may be bodily incorporated into the structure of the primary reference; nor is it that the claimed invention must be expressly suggested in any one or all of the references. Rather, the test is what the combined teachings of the references would have suggested to those of ordinary skill in the art. See *In re Keller*, 642 F.2d 413, 208 USPQ 871 (CCPA 1981). Dusenberry has been relied upon for the teaching of automatically loading and removable cores on a mandrel. Other mandrel supports and arrangements could be used. A turret is not required. The principle of operation of loading apparatus does not depend on the use of a turret for supporting the mandrels.

With regard to claims 85 and 86 (sections VII.B.1. and VII.C.1. of the brief), the comments above concerning claim 82 apply, as well, to the product stripping apparatus taught by Dusenbery.

Appellants have not contested the propriety of the double patenting rejection (section VIII. of the brief), but argue that it should be withdrawn. However, even if the double patenting rejection were the only remaining rejection of the claims, terminal disclaimers in all or all but one of the applications involved would be required to overcome the rejection as stated in the cited section of the MPEP.

**(11) Related Proceeding(s) Appendix**

No decision rendered by a court or the Board is identified by the examiner in the Related Appeals and Interferences section of this examiner's answer.

For the above reasons, it is believed that the rejections should be sustained.

Respectfully submitted,

/John Q. Nguyen/

Supervisory Patent Examiner, Art Unit 3654

/SJH/  
4/22/09

Conferees:

Marc Jimenez /MJ/

John Nguyen /JN/